STATE OF CALIFORNIA

PETE WILSON, *Governor*

DELTA PROTECTION COMMISSION
14215 RIVER ROAD
P.O. BOX 530
'ALNUT GROVE, CA 95690
.ONE: (916) 776-2290
FAX: (916) 776-2293

January 6, 1997

Dick Daniel
CALFED
1416 Ninth Street
Sacramento, CA 95814

Subject: Comments on CALFED Bay-Delta Program Ecosystem Restoration Program Plan, Implementation Objectives and Targets

Dear Mr. Daniel:

I am writing regarding the above-named report dated November 15, 1996; you have requested written comments by January 6, 1996. In addition, I attended the November 19, 1996 Workshop; the November 26, 1996 Ecosystem Restoration Workgroup meeting, the December 10, 1996 Ecosystem Restoration Workshop; and the January 3, 1996 Ecosystem Restoration Workshop. The Delta Protection Commission itself has not reviewed the above-named report, so these are staff comments only.

Overall Approach:

I am concerned that the restoration program does not integrate explanations of the causes of destruction of the ecosystems. For example, the targets section selects different years or periods of years as goals to reproduce through the ecosystem restoration program. But, there has been no delineation or listing of the causes of the downturn of various species, nor is there any analysis of if the causes of these downturns can be reversed, and if yes, what is the likelihood of the reversal and at what cost.

For example, Table 9 lists secondary ecosystem processes and functions implementation objectives and targets, and includes "nutrient inputs and availability". The objective states "maintain, enhance, or restore the amounts of basic nutrients available to the food web of estuarine and riverine systems" and the target is to restore nutrients to the levels consistent with the mid-1960's.

There needs to be a description and an analysis of what happened after the mid-1960's to reduce the amounts of basic nutrients in the Bay Delta; was it removal of shaded riverine aquatic vegetation? was it importation of exotic species, such as the Asian clam? was it changes in the salinity levels of the water that affected bottom of the food chain species? was it changes in the water temperatures that affected bottom

of the food chain species? was it clean water programs that diverted cannery wastes from Delta waterways? Then there needs to be analysis of which of these identified changes can be reversed, what would be the cost, and what would be the environmental benefit? Are there "stand alone" changes, or must groups of changes be implemented together to be affective? What are the priorities? For example, it is unlikely that exotic species can be eliminated from the ecosystem; what affect does that have on goals of restoring the ecosystem?

Analysis of the causes of changes to the ecosystem must be included to allow fuller evaluation of what changes should be funded and implemented.

Evaluation of Effects of the Proposed Objectives and Targets:

Table 10 starts to outline more specific changes to the ecosystem to restore functions which have been diminished. The targets are too general to allow adequate evaluation or understanding of what is proposed. The targets do not identify where the actions would take place: in the watershed (east, north and south of the Delta), in the Delta, in the Suisun Marsh, or in the Bay. Because each of these areas had different historic ecosystems, and because the targets should be matched with the appropriate ecosystem, the targets should identify in which of the four general areas, the proposed actions would take place. If there are actions which would apply in more than one area, each area should be identified, with a general proportion.

For example, the wildfire targets seem to be closely linked with watershed areas ("reduce fuel loads in upper watershed", "mature riparian forests"). Would the restoration program reintroduce fire as a land management tool in the Delta where there have been problems associated with burning of peat soils, or are the targets focused on the watershed areas?

The program should consider adding some targets which reflect the interests of the humans that use and abuse the ecosystems. These could include swimmability of the waterways; edibility of the preferred fishes; etc. This type of approach has been used by the Tennessee Valley Authority in their annual report to the public, "River Pulse". The various waterways are rated for conditions for aquatic life; if the fish can be eaten; if it is safe to swim. In addition there is an overall evaluation of various watersheds for overall ecological health, water contact, and fish consumption.

Protection of Agricultural Land Uses:

The Delta Protection Commission's adopted Plan includes a policy which states "The priority land use of areas of prime soil shall be agriculture. If commercial agriculture is no longer feasible due to subsidence or lack of adequate water supply or water quality, lands uses which protect other beneficial uses of Delta resources, and which would not adversely affect agriculture on surrounding lands, or viability or cost of levee maintenance, may be permitted..."

The sites where CALFED would recommend replacement of agriculture with enhancement projects should be specifically identified to allow evaluation of impacts to agriculture on areas of prime soil. CALFED staff has apparently dropped the proposal to retire agricultural lands on the west side of the San Joaquin Valley due to regional economic impacts, even though land retirement is an accepted program which has been "on the table" as a means of minimizing adverse salinity impacts to the South Delta. There has not been a clarification of possible impacts to Delta agricultural lands; these impacts need to be clearly described so there can be an appropriate debate of associated impacts and issues.

A range of enhancement sites should be discussed and evaluated, for example, water-covered sites (Franks Tract, Big Break, etc) that could be enhanced through placement of fill material to create shallow water habitat.

Miscellaneous Comments:

p. 11: Identify which of the objectives apply to: Delta, Suisun Marsh, Downstream/Bay, or Watershed.

p. 17: See comment above.

p.17-18: Use habitats, or guilds, rather than species. Or use a representative species which addresses habitat for a guild. Don't mix habitats, and species, and guilds.

p. 19: Statement about restoration of natural sediment processes is too general to evaluate.

p. 23: Identify what areas of the floodplain are suitable for restoration of historic floodplain inundation and if existing floodplain areas be used more effectively (i.e. Yolo Bypass).

p. 25: Be clear that stressors were intentional; the levees were intended to hold back water. Add at least a couple of reasons why the stressors were put into use by the humans; i.e. dredging in Delta water to compensate for gravels released from placer mining which filled channels causing increased flooding and prohibiting navigation; dredging also maintains channels for shipping and recreational boating, and for flood water transportation.

p. 26: By being too brief, statements are contradictory; water management says flood control releases into bypasses cause stranding of adult and juvenile fish, but does not address the historic fate of fish in seasonal wetland areas.

p. 29: Valley oak woodland and perennial grassland are referenced in the "ERPP focus area"; those terms should be defined. The issue of adaptation of "wetland-associated wildlife species" to agricultural wetlands and agricultural uplands should be more fully described and analyzed.

p. 45-47: Identify if targets are related to Delta, Suisun Marsh, Downstream and/or Watershed. Because there is no explanation of how the ecosystem was degraded, there is no way to determine if the target is reasonable or not.

p.49-56: Revise to minimize impacts of dredging; include buffers within sites changed to habitat use.

p. 57-66: Define areas and habitats proposed specifically rather than downstream or upstream, to allow evaluation. Analyze and include in the listed acreages the sites already proposed for this type of land use change (Yolo Bypass, Twitchell, Sherman, Stone Lakes, Prospect Island, Natomas HCP, etc.). Define shallow open-water habitat and deep, open-water habitat. Address vernal pool associations with specific soil types.

Please feel free to call if you have questions about these comments.

Sincerely,

Margit Aramburu
Executive Director

cc: Chairman Patrick McCarty

D-022954